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Hawley-Nelson et al.

[11] **Patent Number:** 5,736,392[45] **Date of Patent:** Apr. 7, 1998[54] **PEPTIDE-ENHANCED CATIONIC LIPID TRANSFECTIONS**

[75] **Inventors:** Pamela Hawley-Nelson, Silver Spring; Jianqing Lan, Germantown; Po Jen Shih, Columbia; Joel A. Jessee, Mt. Airy; Kevin P. Schifferli, Germantown, all of Md.

[73] **Assignee:** Life Technologies, Inc., Rockville, Md.

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Related U.S. Application Data

[63] **Continuation-in-part of Ser. No. 477,354, Jun. 7, 1995, abandoned.**

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[58] **Field of Search** 435/320.1, 172.3; 436/71; 530/350

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Primary Examiner—James Ketter

Assistant Examiner—John S. Brusca

Attorney, Agent, or Firm—Greenlee, Winner & Sullivan, P.C.

[57] **ABSTRACT**

The present invention discloses compositions useful for transfecting eukaryotic cells comprising nucleic acid complexes with peptides, proteins or protein fragments, wherein the peptide is optionally covalently coupled to a DNA-binding group, and cationic lipids useful for transfecting eukaryotic cells. Methods for the preparation of transfecting compositions and use as intracellular delivery agents and extracellular targeting agents are also disclosed.

34 Claims, 8 Drawing Sheets